AMENDMENTS TO THE CLAIMS

Please cancel claims 6 and 15, amend claims and 16 and add claim 21 as indicated among the following complete set of pending claims:

Claim 1. (currently amended) A closed ink supply system wherein air is sealed outside the system and not allowed to flow into components of the system, the system comprising:

(1) an ink source;

(2) a first ink sub-reservoir comprising:

(a) a first top fluid surface at a first sub-reservoir fluid height;

(b) a first sub-reservoir ink inlet fluidly connected to the ink source; and

(c) a first sub-reservoir outlet and a second sub-reservoir outlet that is above the first sub-reservoir outlet;

(3) a print head comprising:

(a) a first print head portion fluidly connected to the first sub-reservoir outlet and having a first pressure at the first print head portion; and

(b) a second print head portion fluidly connected to the second sub-reservoir outlet and having a second pressure at the second print head portion substantially equal to the first pressure, the second print head portion being above the first print head portion by a difference proportional to a difference between the second and first sub-reservoir outlets;[[, whereby a first pressure at the first print head portion is substantially equal to a second pressure at the second print head portion]]

(c) wherein the first and second pressures are primarily caused by capillary forces.

Claim 2. (Original) The ink supply system of claim 1 further comprising:

(4) a valve system fluidly connected between the ink source and the first sub-reservoir ink inlet;

(5) an actuator system connected to the valve system; and

(6) a first sensor connected to the actuator system, wherein the first sensor senses the first sub-reservoir fluid height, such that if the first sub-reservoir fluid height is below a first height range, the first sensor emits a signal to the actuator system, whereby the actuator system actuates the valve system, allowing ink to flow from the ink source to the first sub-reservoir ink inlet, and if the first sub-reservoir fluid height is above the first height range, the first sensor emits a signal to the actuator system, whereby the actuator system actuates the valve system, preventing ink from flowing from the ink source to the first sub-reservoir ink inlet.

Claim 3. (Original) The ink supply system of claim 2, wherein the actuator system comprises a first actuator connected to the first sensor, and wherein the valve system comprises a first valve connected to the first actuator.

Claim 4. (Original) The ink supply system of claim 1, wherein the ink source comprises a main reservoir, and wherein a fluid connection between the first sub-reservoir ink inlet and the ink source comprises a gravity-fed conduit extending from the ink source to the first sub-reservoir ink inlet.

Claim 5. (Original) The ink supply system of claim 1, wherein the first sub-reservoir ink inlet is located at an upper portion of the first sub-reservoir, and wherein the first sub-reservoir outlet and the second sub-reservoir outlet are located at a lower portion of the first sub-reservoir.

Claim 6. (Canceled)

Claim 7. (Original) The ink supply system of claim 1 further comprising:

(4) a pressure source; and

wherein the first ink sub-reservoir further comprises:

(d) a first sub-reservoir pressure inlet fluidly connected to the pressure source.

Claim 8. (Original) The ink supply system of claim 1 further comprising:

(4) a second ink sub-reservoir comprising:

(a) a second top fluid surface at a second sub-reservoir fluid height that is above the first sub-reservoir fluid height;

(b) a second sub-reservoir ink inlet fluidly connected to the ink source; and

(c) a third sub-reservoir outlet and a fourth sub-reservoir outlet that is above the third sub-reservoir outlet; and

wherein the print head further comprises:

(c) a third print head portion fluidly connected to the third sub-reservoir outlet; and

(d) a fourth print head portion fluidly connected to the fourth sub-reservoir outlet, the fourth print head portion being above the third print head portion and the third print head portion being above the second print head portion, whereby a third pressure at the third print head portion and a fourth pressure at the fourth print head portion are substantially equal to the first pressure at the first print head portion and the second pressure at the second print head portion.

Claim 9. (Original) The ink supply system of claim 8 further comprising:

(5) a valve system fluidly connected between the ink source and the first sub-reservoir ink inlet and the second sub-reservoir ink inlet;

(6) an actuator system connected to the valve system;

(7) a first sensor connected to the actuator system, wherein the first sensor senses the first sub-reservoir fluid height, such that if the first sub-reservoir fluid height is below a first height range, the first sensor emits a signal to the actuator system, whereby the actuator system actuates the valve system, allowing ink to flow from the ink source to the first sub-reservoir ink inlet, and if the first sub-reservoir fluid height is above the first height range, the first sensor emits a signal to the actuator system, whereby the actuator system actuates the valve system, preventing ink from flowing from the ink source to the first sub-reservoir ink inlet; and

(8) a second sensor connected to the actuator system, wherein the second sensor senses the second sub-reservoir fluid height, such that if the second sub-reservoir fluid height is below a second height range, the second sensor emits a signal to the actuator system, whereby the actuator system actuates the valve system, allowing ink to flow from the ink source to the second sub-reservoir ink inlet, and if the second sub-reservoir fluid height is above the second height range, the second sensor emits a signal to the actuator system, whereby the actuator system actuates the valve system, preventing ink from flowing from the ink source to the second sub-reservoir ink inlet.

Claim 10. (Original) The ink supply system of claim 9, wherein the actuator system comprises a first actuator connected to the first sensor and a second actuator connected to the second sensor, and wherein the valve system comprises a first valve connected to the first actuator and a second valve connected to the second actuator.

Claim 11. (Original) The ink supply system of claim 8, wherein the ink source comprises a main reservoir, and wherein fluid connections between the first sub-reservoir ink inlet and the ink source and the second sub-reservoir ink inlet and the ink source comprise gravity-fed conduits extending from the ink source to the first sub-reservoir ink inlet and the ink source to the second sub-reservoir ink inlet respectively.

Claim 12. (Original) The ink supply system of claim 8, wherein the first sub-reservoir ink inlet is located at an upper portion of the first sub-reservoir, wherein the first sub-reservoir outlet and the second sub-reservoir outlet are located at a lower portion of the first sub-reservoir; wherein the second sub-reservoir ink inlet is located at an upper portion of the second sub-reservoir, and wherein the third sub-reservoir outlet and the fourth sub-reservoir outlet are located at a lower portion of the second sub-reservoir.

Claim 13. (Original) The ink supply system of claim 8, wherein the first ink sub-reservoir and the second ink sub-reservoir are adjustable in height.

Claim 14. (Original) The ink supply system of claim 8 further comprising:

(4) a pressure source;

wherein the first ink sub-reservoir further comprises:

(d) a first sub-reservoir pressure inlet fluidly connected to the pressure source; and

wherein the second ink sub-reservoir further comprises:

(d) a second sub-reservoir pressure inlet fluidly connected to the pressure source.

Claim 15. (Canceled)

Claim 16. (Currently amended) A method of supplying ink to a print head through a closed ink supply system wherein air is sealed outside the system and not allowed to flow into components of the system, the method comprising the steps of:

(1) supplying ink from a first ink sub-reservoir to a first print head portion fluidly connected to a first sub-reservoir outlet of the first ink sub-reservoir;

(2) supplying ink from the first ink sub-reservoir to a second print head portion above the first print head portion fluidly connected to a second sub-reservoir outlet above the first sub-reservoir outlet of the first ink sub-reservoir;[[, whereby]]

(3) causing a first pressure at the first print head portion[[is]] to be substantially equal to a second pressure at the second print head portion by capillary forces;

[[(3)]](4) sensing a first sub-reservoir fluid height;

[[(4)]](5) supplying ink to the first ink sub-reservoir if the first sub-reservoir fluid height is below a first height range; and

[[(5)]](6) ceasing supplying ink to the first ink sub-reservoir if the first sub-reservoir fluid height is above the first height range.

Claim 17. (Currently amnded) The method of claim 16, further comprising the steps of:

(6) supplying ink from a second ink sub-reservoir to a third print head portion above the second print head portion fluidly connected to a third sub-reservoir outlet of the second ink sub-reservoir;

(7) supplying ink from the second ink sub-reservoir to a fourth print head portion above the third print head portion fluidly connected to a fourth sub-reservoir outlet above the third sub-reservoir outlet of the second ink sub-reservoir;[[, whereby]]

(8) causing a third pressure at the third print head portion[[is]] to be substantially equal to a fourth pressure at the fourth print head portion by capillary forces;

[[(8)]](9) sensing a second sub-reservoir fluid height above the first sub-reservoir fluid height;

[[(9)]](10) supplying ink to the second ink sub-reservoir if the second sub-reservoir fluid height is below a second height range; and

[[(10)]](11) ceasing supplying ink to the second ink sub-reservoir if the second sub-reservoir fluid height is above the second height range.

Claim 18. (Currently amended) The method of claim 16,[[wherein the step of]] further comprising supplying ink to the first ink sub-reservoir[[comprises]] by using gravity to feed ink through a conduit that extends from an ink source to the first ink sub-reservoir.

Claim 19. (Original) The method of claim 16, wherein the step of supplying ink to the first ink sub-reservoir comprises actuating a valve system, and wherein the step of ceasing supplying ink to the first ink sub-reservoir comprises actuating the valve system.

Claim 20. (currently amended) The method of claim[[16]] 17 further comprising[[the step of]]:

[[(6)]](12) causing the first and second pressures to be equal to the third and fourth pressures by adjusting a height of at least one of the first ink sub-reservoir and the second sub-reservoir relative to the other of the first sub-reservoir and the second sub-reservoir.

Claim 21. (New) A closed ink supply system wherein air is sealed outside the system and not allowed to flow into components of the system, the system comprising:

(1) an ink source;

(2) a first ink sub-reservoir comprising:

(a) a first top fluid surface at a first sub-reservoir fluid height;

(b) a first sub-reservoir ink inlet fluidly connected to the ink source; and

(c) a first sub-reservoir outlet and a second sub-reservoir outlet that is above the first sub-reservoir outlet;

(3) a height adjustment mechanism connected to the first sub-reservoir; and

(4) a print head comprising:

(a) a first print head portion fluidly connected to the first sub-reservoir outlet and having a first pressure at the first print head portion; and

(b) a second print head portion fluidly connected to the second sub-reservoir outlet and having a second pressure at the second print head portion;

(c) the second print head portion being above the first print head portion by a difference proportional to a difference between the second and first sub-reservoir outlets;

(c) wherein the first and second pressures are caused by gravity-fed pressure head, capillary forces, and the relative height to which the first sub-reservoir is adjusted.